

**FIRE DEPARTMENT MECHANIC**

(Competitive Class)

**DISTINGUISHING FEATURES OF THE CLASS**

This class encompasses a highly responsible and specialized position, involving the repair and maintenance of department vehicles and equipment. Incumbents of this class diagnose mechanical problems and conduct safety inspections on all departmental vehicles. Employees of this class maintain, repair, make adjustments to and organize replacement parts for all departmental vehicles, fire apparatus and equipment. Fire Department Mechanics perform duties with little supervision in most areas, performing special tasks assigned with only general instructions, and report to and have work reviewed by the Fire Chief.

**EXAMPLES OF WORK**

Examples listed below are illustrative only. They are not intended to include all duties which may be assigned, neither are they intended to exclude other duties which may be logical assignments to this class.

Performs maintenance on or makes repairs to brake systems which include drum brakes, disc brakes, power brakes, and master cylinders. Performs maintenance on cooling systems including liquid and air cooling systems, radiators, thermostats, water pumps and hoses, and fans and fan belts. Maintains drive train systems, such as standard and automatic transmissions, clutches, drive shafts, differentials, and universal joints. Maintains fuel systems, including fuel pumps, carburetors, fuel lines and filters, and chokes. Maintains lubricating systems, including oil pumps, oil filters, oil seals, and PCV systems. Maintains suspension systems, including front and rear end assemblies, wheel alignment, steering linkages, power steering systems, tires, wheel bearings, and ball joints. Maintains diesel engines, including starting-air and scavenging-air compressors, air-starting valves, governor, fuel spray nozzles, and turbochargers. Maintains gasoline engines, including intake and exhaust manifolds, cylinder heads, crankshafts, engine bearings, tappets, gaskets, vales, camshafts, and valve lifters. Maintains emission systems, including mufflers, resonators, and catalytic converters.

Performs maintenance on or makes repairs to electrical systems, including batteries, starter systems, generators, alternators, ignition systems, points, coils, condensers, distributors, spark plugs and cables, and electronic ignitions. Maintains accessories on automotive equipment, including speedometers, tachometers, lights and flashers, and windshield wipers. Uses automotive maintenance instruments in the maintenance or repair of fire

automotive equipment, including oscilloscopes, hydrometers, voltmeters, dwell-tachometers, vacuum gauges, and dynamometers. Maintains hydraulic equipment, including aerial hydraulic pumps, aerial ladders, hydraulic motors, and hydraulic cylinders.

Performs required safety inspections on all department vehicles. Road tests vehicles and operates all equipment, including communications equipment, to determine what repairs are needed or to determine that repairs were effectively accomplished. Performs general maintenance tasks such as refueling vehicles, changing and adding oil, adjusting headlights, and similar tasks. Repairs fire apparatus fixtures such as rotary gear, pumps, water towers, and aerial ladders. Diagnoses mechanical problems from information supplied by firefighters or fire equipment operators. Determines if firefighting apparatus involved in an accident is safe for continued use. Makes repairs at the emergency scene when needed.

Locates outside services for the repair and maintenance of department equipment or assigns such to qualified division personnel, in accordance with department procedures. Transports, delivers, and picks up equipment for maintenance. Arranges for the repair of department equipment which cannot be repaired within the department and inspects equipment after repairs ensure they were properly accomplished. Organizes and stores department property, equipment, and supplies in an orderly fashion to allow ease of locating and retrieving materials.

Personally completes and files forms and records as required. Retrieves records, reports, or forms when needed. Maintains inventory of supplies and equipment necessary to perform the work of the assigned section or division.

Performs any related duties as assigned.

#### **QUALIFICATION REQUIREMENTS**

Unless otherwise specified, all requirements listed below must be met by the filing deadline for application for admission to the examination.

Must meet all requirements of the Municipal Fire and Police Civil Service Law, including being a citizen of the United States and of legal age.

Must not be less than twenty-one (21) years of age.

After offer of employment, but before beginning work in this class, must pass a physical examination, the selection and administration of which shall be authorized by the Appointing Authority, designed to demonstrate good health and physical fitness sufficient to perform the essential duties of the position, with or without accommodation.

Must possess a valid driver's license.

Applicant must possess one of the following: high school diploma, general educational development (G.E.D.) certificate, high school transcript, affidavit from the issuing high school, associate's or bachelor's degree, or college transcript, any one of which must indicate that graduation has occurred or a degree awarded. A certification of completion shall not be sufficient to substitute for a diploma or G.E.D. certificate.

Must have at least five (5) years experience in automotive and heavy truck repair.

Must be certified as a Basic A.S.E. (Automotive Service Excellence) Mechanic or E.V.T. (Emergency Vehicle Technician) or equal.